IN THE CLAIMS

Please amend the claims as follows:

1. (Currently Amended) A method of decoding possibly mutilated code words (r) of a code (C), wherein an information word (m) and an address word (a) are encoded into a code word (c) of said code (C) using a generator matrix (G) and wherein said address words (a) are selected such that address words (a) having a predetermined relationship are assigned to consecutive code words (c), said method comprising the steps of:

decoding differences (D) of ~~a number~~at least two (L-1) ~~of~~ pairs of possibly mutilated code words (r_i, r_{i+1}) to obtain estimates (u, v) for the differences of the corresponding pairs of code words (c_i, c_{i+1});

combining said estimates (u, v) to obtain a number (L) of at least two corrupted versions (w_j) of a particular code word (c);

forming a code vector (z) from said number (L) of corrupted versions (w_j) of said particular code word (c) in each coordinate;

decoding said code vector (z) to obtain a decoded code word (c') in said code (C); and

using said generator matrix (G) to obtain the information word (m) and the address word (a) embedded in said decoded code word (c').

2. (Previously Presented) The method as claimed in claim 1, wherein the step of forming said code vector (z) is performed by majority voting.

3. (Previously Presented) The method as claimed in claim 2, wherein in the step of forming said code vector (z), a coordinate of said code vector (z) is erased if more than one value occurs most frequent among said number (L) of corrupted versions (w_j) of said particular code word (c).

4. (Previously Presented) The method as claimed in claim 1, wherein in the step of forming said code vector (z), reliability information, available on the symbols of one or more possibly mutilated code words (r), is used for selecting the coordinates of said code vector (z).

5. (Currently Amended) The method as claimed in claim 1, wherein in the step of decoding the differences (D) of ~~a number~~at least two (L-1) ~~of~~ pairs of possibly mutilated code words (r), the difference of a pair of possibly mutilated code words (r_i, r_{i+1}) is decoded to the closest code word from a subcode (C') consisting of all possible differences of two consecutive code words (c) of the code (C), said closest code word being used as an estimate (u).

6. (Currently Amended) The method as claimed in claim 1, wherein said method further comprises, after the step of decoding the differences (D) of ~~a number~~at least two (L-1) ~~of~~ pairs of possibly mutilated code words (r) to obtain said estimates (u, v), a step of:

checking if said estimates (u, v) show a predetermined form and/or have a possible value.

7. (Previously Presented) The method as claimed in claim 1, wherein said address words (a) assigned to consecutive code words (c) are consecutive sector addresses of sectors of an information carrier storing said code words (c).

8. (Currently Amended) The method as claimed in claim 1, wherein in said step of decoding the differences (D) of ~~a number~~at least two (L-1) ~~of~~ pairs of possibly mutilated code words (r), at least two pairs of two consecutive possibly mutilated code words (r) are decoded.

9. (Previously Presented) A method of decoding possibly mutilated code words (r) of a code (C), wherein an information word (m) and an address word (a) are encoded into a code word (c) of said code (C) using a generator matrix (G) and wherein said address

words (a) are selected such that address words (a) having a predetermined relationship are assigned to consecutive code words (c), said method comprising the steps of:

decoding differences (D) of a number (L-1) of pairs of possibly mutilated code words (r_i, r_{i+1}) to obtain estimates (u, v) for the differences of the corresponding pairs of code words (c_i, c_{i+1});

combining said estimates (u, v) to obtain a number (L) of at least two corrupted versions (w_j) of a particular code word (c);

forming a code vector (z) from said number (L) of corrupted versions (w_j) of said particular code word (c) in each coordinate;

decoding said code vector (z) to obtain a decoded code word (c') in said code (C); and

using said generator matrix (G) to obtain the information word (m) and the address word (a) embedded in said decoded code word (c'),

wherein, in said step of combining said estimates (u, v) to obtain an number (L) of corrupted versions (w_j) of a particular code word (c), a first corrupted version (w_1) corresponds to a first possibly mutilated code word (r_1), a second corrupted version (w_2) corresponds to the difference between a second possibly mutilated code word (r_2) and a first estimate (u), obtained by decoding the

difference between said first and said second possibly mutilated code words (r_1, r_2), and a third corrupted version (w_3) corresponds to the difference between a third possibly mutilated code word (r_3), said first estimate (u) and a second estimate (v), obtained by decoding the difference between said second and said third possibly mutilated code words (r_2, r_3).

10. (Currently Amended) The method as claimed in claim 1, wherein said method further comprises a step of:

using a priori known information of address word (a) embedded in said possibly mutilated code word (r) to decode said code word (r) before decoding the differences (D) of ~~a number~~at least two (L-1) ~~of~~ pairs of possibly mutilated code words (r).

11. (Currently Amended) An apparatus for decoding possibly mutilated code words (r) of a code (C), wherein an information word (m) and an address word (a) are encoded into a code word (c) of said code (C) using a generator matrix (G) and wherein said address words (a) are selected such that address words (a) having a predetermined relationship are assigned to consecutive code words (c), said apparatus comprising:

first decoding means for decoding differences (D) of ~~a number~~at least two (L-1) ~~of~~ pairs of possibly mutilated code words

(r_i, r_{i+1}) to obtain estimates (u, v) for the differences of the corresponding pairs of code words (c_i, c_{i+1});

combining means for combining said estimates (u, v) to obtain a number (L) of at least two corrupted versions (w_j) of a particular code word (c);

forming means for forming a code vector (z) from said number (L) of corrupted versions (w_j) of said particular code word (c) in each coordinate;

second decoding means for decoding said code vector (z) to obtain a decoded code word (c') in said code (C); and

use means for using said generator matrix (G) to obtain the information word (m) and the address word (a) embedded in said decoded code word (c').

12. (Previously Presented) A computer program comprising computer program code means for causing a computer to perform the steps of the method as claimed in claim 1 when said computer program is run on said computer.